

# THE UNIVERD STATES OF AMERICA

TO ALL TO WHOM THESE PRESENTS SHALL COME:

AroSeeds Marketing, Inc.

MACCORS, THERE HAS BEEN PRESENTED TO THE

# Secretary of Agriculture

AN APPLICATION REQUESTING A CERTIFICATE OF PROTECTION FOR AN ALLEGED DISTINCT VARIETY OF SEXUALLY REPRODUCED, OR TUBER PROPAGATED PLANT, THE NAME AND DESCRIPTION OF WHICH ARE CONTAINED IN THE APPLICATION AND EXHIBITS, A COPY OF WHICH IS HEREUNTO ANNEXED AND MADE A PART HEREOF, AND THE VARIOUS REQUIREMENTS OF LAW IN SUCH CASES MADE AND PROVIDED HAVE BEEN COMPLIED WITH, AND THE TITLE THERETO IS, FROM THE RECORDS OF THE PLANT VARIETY PROTECTION OFFICE, IN THE APPLICANT(S) INDICATED IN THE SAID COPY, AND WHEREAS, UPON DUE EXAMINATION MADE, THE SAID APPLICANT(S) IS (ARE) ADJUDGED TO BE ENTITLED TO A CERTIFICATE OF PLANT VARIETY PROTECTION UNDER THE LAW.

NOW, THEREFORE, THIS CERTIFICATE OF PLANT VARIETY PROTECTION IS TO GRANT UNTO THE SAID APPLICANT(S) AND THE SUCCESSORS, HEIRS OR ASSIGNS OF THE SAID APPLICANT(S) FOR THE TERM OF TWENTY YEARS FROM THE DATE OF THIS GRANT, SUBJECT TO THE PAYMENT OF THE REQUIRED FEES AND PERIODIC REPLENISHMENT OF VIABLE BASIC SEED OF THE VARIETY IN A PUBLIC REPOSITORY AS PROVIDED BY LAW, THE RIGHT TO EXCLUDE OTHERS FROM SELLING THE VARIETY, OR OFFERING IT FOR SALE, OR REPRODUCING IT, OR PORTING IT, OR EXPORTING IT, OR CONDITIONING IT FOR PROPAGATION, OR STOCKING IT FOR ANY OF THE PURPOSES, OR USING IT IN PRODUCING A HYBRID OR DIFFERENT VARIETY THEREFROM, TO THE EXTENT ED BY THE PLANT VARIETY PROTECTION ACT. (84 STAT. 1542, AS AMENDED, 7 U.S.C. 2321 ET SEQ.)

FESCUE, HARD

'Viking'

In Vestimonn Macrost, I have hereunto set my hand and caused the seal of the Mant Mariety Protection Office to be affixed at the City of Washington, D.C. this twenty-seventh day of September, in the year two thousand and seven.

Allast.

Commissionen

Plant Variety Protection Office Agricultural Marketing Service Agriculturo

REPRODUCE LOCALLY, Include from our bar and the	ete on ell reprodu	c/Jons	<del></del>		Form Approved - OMB No 0581.0055
	NT OF ACRECULTI		1) a following statements are made in 8 a Paparwork Reduction Act (PRA)	accordano gr 1985.	e with the Privacy Act of 1974 (5 U.S.C. 552e) and
SCIENCE AND TECHNOLOGY - P APPLICATION FOR PLANT VA	LANT VARIETY PF RIETY PROTECTI	ROTECTION OFFICE ON CERTIFICATE	A rolication or required in order to deta (1 U.S.C. 2421), information to held o	emeno d a p confidential	pient veriety protection certificate is to be essued units certificate is issued (7 U.S.C. 2426).
(Instructions and Information col	SECTION DUTOWN SINS	Miletil Ottrenesse)	2. TEMPORARY DESIGNATION OR	AV .E	RICTYNAME
ProSeeds Marketing . Inc. (87:8/	(6/2003)		AHTHF1, EHF1	Viki	ng
4 ADDRESS (Shoel and No. or R.F.D. No., CRy,	SMM, and ZIP Co.	de, and Country)	3 (ELEPHONE (Include area code)		FOR OFFICIAL USE OHLY
13963 Westside Lanc S. Jefferson, OR 97352			(541) 928-9999 6 FAX (include area code)		L00400227
			(541) 924-5695		G DATE
7 IF THE OWNER NAMED IS NOT A "PERSON", ORGANIZATION (corporation, partnership, asso		8 IF INCORPORATED, GIVE STATE OF INCORPORATION	9 DATE OF INCORPORATION	7	may 21, 2004
corporation	corporation				
10. NAME AND ADDRESS OF OWNER REPRESS  V. G. Lehman  811 Mountain River Dr.  Lehanon, OR 97355	entatīvē(S) TO S	ÉRVE IN THIS APPLICATION, (FAST)	para yn listed will receive ea Dapera)	R B C R I V E O	FILING AND EXAMINATION FEES:  . 3652  DATE 5/2//2004  CERTIFICATION FEE:  . 768.00  DATE 9/21/2007
11. TELEPHONE (Include area code)	12. FAX (Includ	(e eres code)	13. E-MAIL		
(541) 451-1847	(541) 451	1-1847	vlehman@aol.com		
14. CROP KINO (Common Name)	18. FAMILY N	ME (Bolenkal)	18 DOES THE VARIETY CONT	AIN ANY 1	TRANSCENES? (OPTIONAL)
hard fescue	Graminae		YES INO	ASSICNE	OUSDA-APHIS REFERENCE NUMBER FOR THE
15, GENUS AND SPECIES NAME OF CROP	l <u>—</u>	RIETY A FIRST GENERATION HYBRI	APPROVED PETITION TO		LATE THE GENETICALLY MODIFIED PLANT FOR
Festuca longifolia	☐ YE8		COMMERICALIZATION.		
19. CHECK APPROPRIATE BOX FOR EACH ATTI (Follow Instructions on Inverse)	ACHMENT SUBMI	מפָדן	OF CERTIFIED SEED? (S	FY THAT S De Section :	REED OF THIS VARIETY BE SOLD AS A CLASS 83(a) of the Plant Variety Protection Act)
a. [7] Exhibit A. Origin and Breeding History	of the Variety				end ZZ toplow)
b. Dinibit 8 Statement of Detrinitness			21. DOES THE OWNER SPECI NUMBER OF CLASSES?	PY THAT E	SEED OF THIS VARIETY SE LIMITED AS TO
c.  Exhibit C Objective Description of Val	lety		VES NO		
d. Exhibit D. Additional Description of the	Verlaty (Optional)				INDATION D REGISTERED 1 CERTIFIED
e. Dishibit E. Statement of the Basis of th	o Owners Owners	Nip	ZZ. DOES THE OWNER OPECA NUMBER OF GENERATION		EED OF THIS VARIETY BE UMITED AS TO
Voucher Sample (2,500 visible unitranto     varification that tissue culture will be de     repository)			YES NO	IBER 1.2.3.	. etc. FOR EACH CLASS
g. Filing and Examination Fee (\$3,652), n States" (Mad to the Plant Variety Protect		ressure) of the United	D POUNDATION D F	BGISTER	
23. HAS THE VARIETY (INCLUDING ANY HARVES FROM THIS VARIETY BEEN SOLD, DISPOSED OTHER COUNTRIES?			24. IS THE VARIETY OR ANY C	CMPONE	NT OF THE VARIETY PROTECTED BY PLANT BREEDER'S RIGHT OR PATENTY?
T AES NO			☐ AER ☑ NO		
IF YES, YOU MUST PROVIDE THE DATE OF FOR EACH COUNTRY AND THE CIRCUMSTA			IF YES, PLEASE GIVE COUNTRY, DATE OF FILING OR ISSUANCE AND ASSIGNED REFERENCE NUMBER. (PAGES USE RECEIVED ON CAPITAL)		
<ol> <li>The owners declare that a viable sample of beat a tuber propagated veriety a thous culture will be</li> </ol>				econtançe	with such regulations as may be applicable, or for
The undersigned owner(s) biggret the owner of the entitled to protection under the provisions of Secondary to the content of t	ction 42 of the Plan	if Variety Protection Act.		letinct, unif	opm, and stable as required in Section 42, and is
SIGNATIFIED OF OWNER			SC NATURE OF OWNER		
	1-	_   "	and the At Attheb		
NAME (Organo print or type)			A AE (Place print or type)	<del></del>	
EXPANSIVER IVIL	0/50	ـ ـ ـ ـ ـ ـ ـ ـ ـ ـ ـ ـ ـ ـ ـ ـ ـ ـ ـ	A PAGITY OR TITLE	DATE	
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CT 170 ms NV and make the control of			(See murge for majuratio	ez und lafolm	redan codection burtien; sistement)

# Origin and Breeding History of EHF Hard Fescue

EHFTHard fescue (Festuca longifolia Thuill.) is an advanced generation synthetic (BT:6/26/2006) cultivar selected from the maternal progenies of 437 clones. EHF was developed for improved seed yield and turf performance, dark bright green color, freedom from disease and early maturity. Eighty-seven percent of the parental germplasm in EHF contain the Neotyphodium endophyte.

Germplasm sources included selections from old low-maintenance turfs of the eastern USA and the cultivars Biljart, Scaldis, and Waldina. Many of the most promising selections were made in old cemeteries in Newark, Camden, Colonia, Old Bridge, South River, New Brunswick, Tennant, Freehold, and Trenton, NJ; Atlanta, GA and Baltimore, MD; golf course roughs in Linwood, NJ, Long Island, NY, and Trenton, NJ; Johnson Park in Piscataway, NJ; and lawns on the Cook, Douglas, and Rutgers Colleges of Rutgers University, New Brunswick, NJ. The origin of plants selected from old turfs is not known. The history of the turfs and the appearance of the plants indicated they had been present for many decades. It is likely that most were introduced in seed from Europe during the late 1800's and the first few decades of the 1900's. Several of the germplasm sources trace to populations of plants used in an endophyte backcrossing program of Aurora and Reliant Hard fescue. A small percentage (6%) traces to a persistent clone selected from the 1976 fine fescue trial at North Brunswick. Five percent traces to plants selected from the Old Bridge Cemetery in 1988.

Following varying cycles of phenotypic and genotypic selection, two breeding populations were established in 1994 and 1995. The one established in the spring of 1994 contained 872 plants and the one established in the spring of 1995 contained 1600 plants. The plants from both nurseries were selected from better performing turf plots from the 1993 fine fescue trial at North Brunswick. These plants were selected from 130 single-plot progenies from 4 different populations. These plants were subjected to two cycles of selection in 1996 and 1997 named 'Hard-96' and 'Hard-97', respectively for characteristics such as dark green color, high shoot density, early seed maturity and freedom from disease. One nursery was established in the fall of 1996 that contained 1368 plants from progeny of 30 clones included in the 'Hard-96' crossing block. Another nursery was established in the fall of 1997 that contained 640 plants from the progeny of 54 clones included in the 'Hard-97' crossing block. In the spring of 1998, three plants were selected from the 1996 nursery and 485 plants were selected from the 1997 nursery. These 487 plants were selected for dark bright green color, high shoot density, early seed maturity and freedom from disease. These selected plants were moved, prior to anthesis, to an isolated crossing block at Adelphia, NJ. Four hundred and thirty-seven plants from 45 different lines with excellent floret fertility and freedom from disease were harvested. In the fall of 1998, EHP hard fescue was entered in the NTEP national fine leafed fescue test for performance testing throughout the country. The Proseeds Proseeds Marketing, Inc. (2013-1806) remaining 2 lbs. of breeder seed were sent to Agribiotech Inc. purchased this variety from the ABT auction in July, 2001.

EHF was developed using a population improvement program initiated in 1968 at Rutgers University to improve pest resistance, stress tolerance, attractiveness, turf performance, seed yield and the ability to provide an acceptable turf cover without the need for supplemental fertilization or irrigation. The breeding program included

extensive germplasm collection and evaluation. It included the screening of over 50,000 seedlings for disease resistance, the evaluation of over 12,000 individuals in spaced-plant field nurseries, and the testing of over 1,000 single-plant half-sib progenies in turf trials.

The breeding method used in the development of CHIT Hard fescue was a population improvement program involving the evaluation followed by cycles of recurrent phenotypic and genotypic selection. It included 1) selection and evaluation of the most promising genetic material from old turfs, 2) intercrossing the most attractive plants, 3) screening their progenies for resistance to powdery mildew, net blotch and an attractive turf-type growth habit under greenhouse conditions, 4) planting these selected seedlings in isolated spaced-plant field nurseries at either Adelphia or North Brunswick, NJ, 5) removing the least attractive plants from these nurseries prior to anthesis, 6) harvesting seed from the most attractive pest resistant plants with the best floret fertility 7) seeding these single-plant progenies in closely mowed turf trials, 8) selecting attractive plants from the best performing progenies which contained a Neotyphodium endophyte, and 9) repeating the above procedures in a continuing population improvement program to produce EHF hard fescue.

## Statement of Stability:

No objectionable off-type plants or variants have been observed in the reproduction or multiplication of EHF1 (Viking). EHF1 (Viking) is a stable and uniform variety for characteristics described over three generations.

#### Statement of Distinctness:

EHF1 (Viking) is distinct from all other hard fescues by a combination of morphological and turf characteristics. EHF1 (Viking) is most similar to Reliant hard fescue. EHF1 (Viking) has a shorter panicle than Reliant in trials at Lebanon, OR. In addition, EHF1 (Viking) has a purplish anther color where Reliant has a bluish green anther color.

REPRODUCE LOCALLY. Include form number and date on all reproductions.

Form Approved - OMB No. 0581-0055

According to the Paperwork Reduction Act of 1995, an agency may not conduct or sponsor, and a person is not required to respond to a collection of information unless it displays a valid OMB control number. The valid OMB control number for this collection of information is (0381-0055). The time required to complete this information collection is estimated to average 30 minutes per response, including the time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information.

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## U.S. DEPARTMENT OF AGRICULTURE AGRICULTURAL MARKETING SERVICE SCIENCE AND TECHNOLOGY PROGRAM PLANT VARIETY PROTECTION OFFICE **BELTSVILLE, MD 20705**

EXHIBIT C (FINE LEAVED FESCUES)

## **OBJECTIVE DESCRIPTION OF VARIETY** FINE LEAVED FESCUES

	(Festuca spp.)		
NAME OF APPLICANT(S) ProSeeds Marketing, Inc.	(TEMPORAR)	Y DESIGNATION	VARIETY NAME   Viking 
ADDRESS (Street and No., or R.F.D. No., City, State, and Z 13963 Westside Lane S. Jefferson, OR 97352	IP Code)		FOR OFFICIAL USE ONLY
youdisting Off 77352		2	PVPO NUMBERI 00400227
Place the appropriate number that describes the varietal characteristics described, including numerical measurements for SPACED PLANTS. Royal Horticultural Society or any numerical measurements.	s, should represent those the	hat are typical for the be used to determine	variety. Measured data should be plant colors; designate system used:
SPECIES: (With companion varieties for use below	v – use varieties within spa	ecies of application v	ariety)
1 = F. rubra ssp. commutata (Chewings)	11 = Cascade 14 = Banner	12 = Highlight 15 = Barfalla	13 = Jamestown
2 = F. rubra ssp. litoralis (Creeping Red)	21 = Dawson 24 = Pennlawn	22 = Starlight	23 = Merlin
3 = F. rubra ssp. rubra (Spreading Red)	31 = Boreal 34 = Ensylva	32 = Ruby	33 = Fortress
4 = F. ovina (Sheep)	41 = Covar		
5 = F. longifolia (Hard)	51 = Durar	52 = Biljart (C-26	5) 53 = Scaldis
6 = F. tenuifolia (Fine-Leaved Sheep)	61 = Panda	62 = Barok	
7 = Other (Specify) F.			
2. CYTOLOGY:			
Chromosome Number Ploidy	1 = diploid	2 = tetraploid	3 = hexaploid 4 = octoploid
3. ADAPTATION: (0 = Not Tested; 1 = Not Adapted;	; 2 = Adapted)		
2 Northeast 0 Souther	ast 2	North Central	Pacific N.W.
Other (Specify):			A

4.	MAT	URITY: Date First Headed (panicle emergence	e) Location(s) of Trail(s)	
	2	Maturity Class:		
		1 = Very Early (Covar)	2 = Early (Highlight)	3 = Medium Early (Boreal, Dawson)
		4 = Medium Late (Cascade, Ruby)	5 = Late (Jamestown, Agram)	6 = Very Late
		Date Headed4/30/02	<del></del>	
	1 0	Days earlier than	<b>□ )</b>	
		Maturity same as	Comparison Variety	
	1 2	Days later thanMX 86		
5.	PI.AN	JT HEIGHT: (At maturity; to top of panicle; av	verage of 10 tallest culms)	
	5 7 3	7	·	
	6 1	mm charter than Policet	~~	
		Height same as	Comparison Variety	
	86	mm Taller thans	≒ (	
6.	GROW	WTH HABIT:		
	1	1 = Erect (Ruby) 2 = Semi-erect (I	Highlight) 3 = Prostrate (Si	ilvana)
7.	RHIZO	OMES:		
		mm Length mm Width	mm Internode length	
	1	1 = Absent	2 = Weakly Creeping (Dawson)	
		3 = Strongly Creeping (Boreal)	4 = Very Strongly Creeping (Bore	al)
8.	LEAF	BLADE:		
0.		Color:		
	3	1 = Light Green (Starlight) 2 = Med	lium Light Green (Highlight)	3 = Medium Dark Green (Ruby, Agram)
		4 = Dark Green (Jamestown, Manoir)	5 = Bluegreen (Saphir)	6 = Graygreen (Scaldis)
		7 = Other (Specify):		
	1	Glaucosity (Sowing Year):1 = Absent		
	1	Anthocycnin; 1 = Absent 2 = Pres	•	sent 2 = Present
	2	Margins: $1 = \text{Smooth}$ $2 = \text{Sem}$	· · · —	
	1	Margin folding (closure): 1 = Rolled inware	d (closed-Highlight) 2= flat (	Open) (87:8/9/2007)
		Width class: 1 = Very fine (Agram, Fri		town, Highlight, Banner, Dawson)

8.	LEAF	BLADE (Continued):				
	4 9 9 (e)	mm Length (flag leaf) \$8/9/2007 )				
		mm Shorter than		]		
		Blade length same as	.MX86	] }	Comparison Variety	
		mm Longer than		] <b>)</b>		
	1 4 6	mm Width (flag leaf)				
	0 2 3	mm Narrower thanRe	liant	)		
		Blade width same as		Compa	rison Variety	
		mm Wider than	<u> </u>	] <b>)</b>		
9.	LEAF	SHEATH:	·			
	1	Anthocyanin (seedling):	1 = Absent (Highlight)	2 = Present (Jam	estown, Fortress, Marga)	
	ī	Auricle Hairiness:	1 = Absent	2 = Present	No auricle	
	2	Margins:	1 = Open (Highlight)	2 = Closed (Jame	estown)	
				<del></del>		
10.	PANIC	LE: shape=	58% narrow-tapering, 429	% ovate		
	<b>→</b>	Shape:	1 = Narrow-tapering		2 = Ovate	
	_	Tyne= 13 5% int	3 = Oblong termediate, 86.5 compact		4 = Other (Specify):	
	<b>→</b>	Туре:	1 = Open	2 = Intermediate	3 = Compact	
	~	Orientation: 10.	5% erect, 68% nodding, 21 1 = Erect	2 = Nodding		
	2	Branch Pubescence:	1 = Glabrous	2 = Pubescent		
	<b>→</b>	Anther Color:	1 and 4 1 = Yellowish Green	2 = Green	3 = Bluish Green	4 = Purplish
	4	Glume Color at 50% flowering):	5 = Reddish	6 = Other (Specia	fy):	
	977	mm Length				
	(8/97a007	Bt) mm Shorter than		1		
		Panicle length same as		Compar	rison Variety	
	1 8	mm longer than	<u> </u>			
	<b>CBT: 8</b>			1		······································
11.	PALEA	.:				
	2	Hairs (On keels or margin	s): 1 = Absent (Banı	ner)	2 = Short (Agram, Scaldi	s, Olds)

3 = Long (Rainier, Fortress, Jamestown)

3 = Medium Fine (Fortress, Ruby, Scaldis) 4 = Medium Coarse (Engina)

12. LEMN	AA:		
2	Hairs: 1 = Absent (Jamestown)	2 = Sev	eral 3 = Many (Highlight)
4. 9	mm Lemma Length		
	mm Shorter than		
	Lemma length same as		Comparison Variety
	mm Longer than		
0. 9 6	mm Lemma Width		
	mm Narrower than		
<del>1</del>	Lemma width same as	<b>一</b> }	Comparison Variety
	mm Wider than		
2	Awns: 1 = Absent	2 = Present	
	2.6 mm Awn Length		
	mm Shorter than		
	Awn length same as		Comparison Variety
	mm Longer than		
2 SEED	(With learning and males).		
3. SEED	(With lemma and palea):		
<u></u>	Size Class (g/1000 seed):	0 - 50 0 -41 1.17	T
			Jamestown, Highlight)
a a la cal		4 = [>1.3g] (Bor	eal, Golfrood)
81816111	Ang per 1000 seed	<del></del>	
	mg per 1000 seed less than		
	Seed Weight same as		Comparison Variety
	mg per 1000 seed more than		
4. DISEA	SE, INSECT, AND NEMATODE REACTION	n (scale:0=1	ot tested, 1=susceptible, 9=resistant) (BT:8/9/2007 per applicant:
	Melting-out Drechslera poae (Helminthospo		Stripe Rust P. striiformis Zation)
	Leaf Spot D. siccans		Leaf Rust P. poae-nemoralis
	Net Blotch D. dictyoides		P. crandallii
8	Leaf Spot Bipolaris sorokiniana		Pythium Blight Pythum ultimum
	Brown Patch Rhizoctonia solani		9 Red Thread Corticium fusciforme
	Powdery Mildew Erysiphe graminis		Dollar Spot Sclerotinia homoeocarpa
	Stripe Smut Ustilago striiformis		Insect

14.	DISEASE, I	NSECT, AND NEMA	ATODE REACTION (Con	ntinued):	200400	227
	F. I	Patch, Pink snow-mole	1 Fusarium nivale	Nem	atode	
	Fus	arium Blight F. trinci	nctum, F. roseum	8 Othe	rSummer Patch	
	Gra	y Snow Mold <i>Typhul</i>	a iotana	Othe	r	
	Ste	m Rrust <i>Puccinia gra</i> i	minis	Othe	r	
	characteristi  1 = Applicat	cs indicate Degree of i	Resemblence by placing in the comparison variety.  Ker, more disease resistant	n the column marked D.R 2 = Application variety	., one of the followin	
CHAR	ACTER	VARIETY	D.R.	CHARACTER	VARIETY	D.R.
Rhizom	e Length			Growth Habit		
Leaf Wi	dth			Leaf Color		
Panicle	Color			Panicle Shape		
Winter	Color	Defiant	2	Cold Injury		
	olerance			Heat		
Drought	<u> </u>	Berkshire	2	Disease* Summer Patch	Reliant II	3
	* Chaoify and	ch disease evaluated.				
16. ル ン	ADDITION	AL DESCRIPTION:	accuements 2, with 3.	taken on e replication replication	spaced for and a . to be m	e aourel.

Table 1.	Morpholog	ical measur	ements tak	en at Lebar	on, OR, 20	02 on space	ed plants.
		Date	Date	Plant	Flag Leaf	Flag Leaf	Panicle
Variety		heading	flowering	height	iength	width	length
				cm	cm	Mm(81:7/12/6	cm
ABTHF1		4/30	5/30	57.28	4.99	1.46	9.77
MX 86		4/18	5/23	49.24	4.97	1.94	9.53
Koket		5/1	5/30	66.13	6.91	2.42	12.94
Reliant	•	5/2	5/31	63.37	5.80	1.69	10.92
Aurora		5/3	5/30	56.86	5.85	1.72	9.35
Dawson		5/3	5/30	61.88	6.39	2.56	11.16
Shadow		5/4	6/2	65.04	8.01	2.55	12.55
Shademas	ter	5/5	6/3	64.11	8.02	2.78	12.84
Scaldis		5/5	6/1	58.40	5.93	2.02	10.58
Flyer		5/5	6/2	62.43	7.22	3.03	12.38
SR3000		5/6	5/31	58.39	5.79	1.91	9.48
Banner		5/7	6/2	65.02	8.52	2.56	12.21
Ensylva		5/7	6/3	59.06	7.10	3.07	12.61
Boreal		5/9	6/4	65.06	9.18	3.43	13.97
Biljart		5/10	6/2	48.73	4.26	1.50	7.94
Jamestown	L	5/17	6/6	55.92	8.15	2.48	11.69
Barcrown	-	5/19	6/6	56.93	4.65	2.15	8.35
LSD <b>(</b> 0.05 <b>)</b> ( <i>1</i> 817: 8/9/		4.08	2.7	5.15	1.69	1.17	0.25

	Date of heading an			
		Date	Date	
	Variety	Heading	Flowering	
	ABTHF1	4/15/03	5/26/03	
	MX 86	3/28/03	5/12/03	
İ	Koket	4/4/03	5/21/03	
	SR3000	4/7/03	5/24/03	
	Flyer	4/10/03	5/25/03	
	Scaldis	4/11/03	5/25/03	
	Shdmaster	4/11/03	5/24/03	
	ABTHF2	4/13/03	5/25/03	
-819/2007	APTHEA.	4/45/03	<del>5/20/00</del>	
:8/9/2007 rapplicants quest)	Shadow	4/15/03	5/26/03	
juest)	1998D3	4/16/03	5/26/03	
	Reliant	4/16/03	5/26/03	
	Boreal	4/16/03	5/26/03	
	Aurora	4/17/03	5/26/03	
	Dawson	4/19/03	5/27/03	
	Biljart	4/21/03	5/27/03	
	Banner	4/23/03	5/28/03	
(Helot bl)	Jametown	4/24/03	5/29/03	
	Ensylva	4/25/03	5/30/03	
	Barcrown	5/1/03	6/1/03	
-	LSD(0.05)	5.3	2.3	

	Flag leaf	Flag leaf	Panicle	Plant	Flag leaf	(8/9/2007 At
	length	width	Length	Height	height	tants (819/2007 Lt per applicant's request
	cm	MM (H: Apalies	cm	cm	cm	
ABTHF1	5.24	1.24		80.75	18.83	
Aurora	3.81	1.28	9.93	73.34		
Banner	10.78	2.10	14.59	87.79		
Barcrown	9.19	1.69	8.93	61.44		
Boreal	16.44	2.59	16.81	94.77		
Dawson	10.68	1.50	12.24	83.08		
Flyer	13.14	2.58	16.21	94.49		
Jamestown	12.70	2.53	15.53	85.75	29.99	
Koket	12.15	1.90	14.86	89.36		
Reliant	8.64	1.27	10.94	72.11		
Shadow	11.04	2.43	15.13	86.00		
Shademaster	12.51	2.54	15.19	95.13		
SR3000	7.99	1.29	10.89	77.66		
LSD(0.05)	2.54	0.25	1.45	7.90	6.76	

Table 4. Genetic					U	(BT:8/30/2007 per applicant's request)
	Location	Location				7
Variety	NC1	SD1		1		1
ABTHF1	6.30	5.30	.,,			7
Reliant II	5.70	5.00		1		7
Scaldis	5.00	4.30				]
LSD (0.05) (81: 8/9/3407)	1.00	1.20				1
(BT: 8/9/3007)	175.00			1	1	1

Table 5. V	Vinter color,	NTEP trial,	2002. (SE	ale:1-9,9=	Darkest)	(87:8/30/200
	<del> </del>	Location	Location	Location		
Variety		OK1	VA1	WA3		
ABTHF1	<u> </u>	3.00	6.00	8.00		
Reliant II	-	3.00	5.30	8.00		ļ
Scaldis		3.00	6.30	6.70		
LSD <i>(0.05</i> )		1.30	1.40	1.80		
BT: 8/9	1/2007 per a	policants rec	uest)	1.60		

Table 6.	Performar	nce of fine fe	escue grown	n in shade, Me	ad, NB, 2002.	
		April	August	Season Mean	(Seale 1-9,9=best,	(8T: 8/30/200
Variety		1				
ABTHF1		5.7	7.3	6.6		
Reliant II		6.3	7.3	6.6		
Scaldis		5	5.7	5.1		
LSD(0-05)		1.5	1.7	1.1		

(Bi 8/1/2007 per applicants request)

REPRODUCE LOCALLY. Include form number and edition date on all	I reproductions.	ORM APPROVED - OMB No. 0581-0055
U.S. DEPARTMENT OF AGRICULTURE AGRICULTURAL MARKETING SERVICE  EXHIBIT E	Application is required in order to determine if a plant variety protection certificate is to be issued (7 U.S.C. 2421). The information is held confidential until the certificate is issued (7 U.S.C. 2426).	
STATEMENT OF THE BASIS OF OWNERSHIP		
1. NAME OF APPLICANT(S)	2. TEMPORARY DESIGNATION OR EXPERIMENTAL NUMBER	3. VARIETY NAME
ProSeeds Marketing Inc.	ABTHF1, EHF1	Viking
4. ADDRESS (Street and No., or R.F.D. No., City, State, and ZIP, and Country)	5. TELEPHONE (include area code)	6. FAX (Include eree code)
13963 Westside Lane S. Jefferson, OR 97352	(541) 928-9999	(541) 924-5695
	7. PVPO NUMBER 200400227	
8. Does the applicant own all rights to the variety? Mark an "X" in the 9. Is the applicant (individual or company) a U.S. national or a U.S. b		
		الحدا الحدا
10. Is the applicant the original owner? YES NO If no, please answer one of the following:		
a. If the original rights to variety were owned by individual(s), is (are) the original owner(s) a U.S. National(s)?  YES  NO  If no, give name of country		
b. If the original rights to variety were owned by a company(ies)	NO If no, give name of countr	у
11. Additional explanation on ownership (Trace ownership from origin Germplasm was developed at Rutgers which was further develop license from Rutgers to ProSeeds Marketing, Inc. (8/9/2007 bt)		Ine.
PLEASE NOTE:		
Plant variety protection can only be afforded to the owners (not licens	sees) who meet the following criteria:	
If the rights to the variety are owned by the original breeder, that penational of a country which affords similar protection to nationals of a country which affords similar protection.		
<ol><li>If the rights to the variety are owned by the company which employ nationals of a UPOV member country, or owned by nationals of a genus and species.</li></ol>		
3. If the applicant is an owner who is not the original owner, both the	original owner and the applicant must m	eet one of the above criteria.
The original breeder/owner may be the individual or company who dis Act for definitions.	rected the final breeding. See Section 4	1(a)(2) of the Plant Variety Protection
According to the Paperwork Reduction Act of 1995, an agency may not conduct or sponsor, control number. The valid CMB control number for this information collection is 0581-0055, including the time for reviewing the instructions, searching existing data sources, gathering a	The time required to complete this information collec-	tion is estimated to everage 0.1 hour per response,
The U.S. Department of Agriculture (USDA) prohibits discrimination in all its programs and a marital or family status, political beliefs, parental status, or protected genetic information. (Nacommunication of program information (Braille, large print, audiotape, etc.) should contact U	octivities on the basis of race, color, national origin, ge lot all prohibited bases apply to all programs.) Person	nder, religion, age, disability, sexual orientation, is with disabilities who require alternative means for

To file a complaint of discrimination, write USDA, Director, Office of Chil Rights, Room 326-W, Whitten Building, 14th and Independence Avenue, SW, Washington, D.C. 20250-9410 or call (202) 720-5984 (voice and TDD). USDA is an equal opportunity provide and employer.

ST-470-E (04-03) designed by the Plant Variety Protection Office using Word 2000

## ASSIGNMENT OF EHF HARD FESCUE

WHEREAS, Virginia Lehman, Blue Moon Farm, 811 Mountain River Drive, Lebanon, OR 97355; William A. Meyer, 137 Bucks Mill Road, Colts Neck, NJ 07722; Dirk A. Smith; 321 Cedar Grove Lane, Somerset, NJ 08873; and C. Reed Funk, Jr., 4 Delaware Drive, East Brunswick, NJ 08816 have cooperated in the breeding and development of EHF hard fescue.

NOW, THEREFORE, IN CONSIDERATION OF ONE DOLLAR (\$1.00) and other valuable considerations made to each of us, and ONE DOLLAR (\$1.00) and other valuable consideration made to the New Jersey Agricultural Experiment Station, including those made in the Agreement dated August 22, 1998 between the New Jersey Agricultural Experiment Station and Pro Seeds Marketing, Inc., we hereby assign unto said Fro Seeds Marketing, Inc., 13963 Westside Lane S. Jefferson, OR 97352 (formerly AgriBioTech, Inc. 120 Corporate Park Drive, Henderson, NV 89012); our entire interest in EHF hard fescue for the United States and all foreign countries and any plant variety protection to be issued therefore in the United States or any foreign country. The commissioner, Plant Variety Protection Office is requested to issue the plant variety protection certificate in accordance herewith.

Virginia Lehman

Sworn and subscribed to before me this day

of 5 18, 2004.

Notary Public of Oregon

C. Reed Funk, Jr.

Sworn and subscribed to before me this /7 day

of War), 2004.

Notary Public of New Jersey

FRANCINE C. LAANUI NOTARY PUBLIC OF NEW JERSEY Commission Depises 11/29/2004 William A. Meyer

William A. Weyer

Sworn and subscribed to before me this / Tday (May)

of gray, 2004.

Notary Public of New January Public of New J

Dirk A. Smith

Sworn and subscribed to before me this /71/day

of Man 2 2004

Notary Public of New Jersey

FRANCINE C. LAANUI HOTARY PUBLIC OF NEW JERSEY Commission Expires 11/29/2004